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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/559,591	05/09/2006	Malcolm Colin Richards	1600-000006/US/NP	2724
28997 7590 06/25/2007 HARNES, DICKEY, & PIERCE, P.L.C 7700 BONHOMME, STE 400 ST. LOUIS, MO 63105			EXAMINER WAKS, JOSEPH	
			ART UNIT 2834	PAPER NUMBER
			MAIL DATE 06/25/2007	DELIVERY MODE PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

## Office Action Summary

**Application No.**

10/559,591

**Applicant(s)**

RICHARDS ET AL.

**Examiner**

Joseph Waks

**Art Unit**

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 09 May 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-14 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-6 and 8-14 is/are rejected.
- 7) ☐ Claim(s) 7 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 02 December 2005 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
- 1) ☒ Certified copies of the priority documents have been received.
  - 2) ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - 3) ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date 2/12/5.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_.

## **DETAILED ACTION**

### ***Priority***

1. Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which papers have been placed of record in the file.

### ***Specification***

2. Applicant is reminded of the proper language and format for an abstract of the disclosure.

The abstract should be in narrative form and generally limited to a single paragraph on a separate sheet within the range of 50 to 150 words. It is important that the abstract not exceed 150 words in length since the space provided for the abstract on the computer tape used by the printer is limited. The form and legal phraseology often used in patent claims, such as "comprising", "means" and "said," should be avoided. The abstract should describe the disclosure sufficiently to assist readers in deciding whether there is a need for consulting the full patent text for details.

The language should be clear and concise and should not repeat information given in the title. It should avoid using phrases which can be implied, such as, "The disclosure concerns," "The disclosure defined by this invention," "The disclosure describes," etc.

3. The title of the invention is not descriptive. A new title is required that is clearly indicative of the invention to which the claims are directed.

### ***Claim Objections***

4. The numbering of claims is not in accordance with 37 CFR 1.126 which requires the original numbering of the claims to be preserved throughout the prosecution. When claims are canceled, the remaining claims must not be renumbered. When new claims are presented, they must be numbered consecutively beginning with the number next following the highest numbered claims previously presented (whether entered or not).

Misnumbered claims 5-15 been renumbered 4-14.

***Claim Rejections - 35 USC § 112***

5. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

6. Claim 10 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

It is not clear if the recited rotary part is the first or second part as recited in claim 1 or another, different rotary part.

***Claim Rejections - 35 USC § 102***

7. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

8. Claims 1, 2, 5 and 9 are rejected under 35 U.S.C. 102(b) as being anticipated by Peed (US 4,061,926).

Peed discloses invention as claimed: a generator generating an electric current and including current generating means having first generator means 20 and second generator means 22 arranged to generate electric current in response to relative rotation between the first and second generator means, a first rotary part A having vanes 32 rotating in a first direction around an axis when exposed to a flow of air perpendicular to the axis, the first rotary part operatively connected to the first generation means, the axis passing through an axial shaft about which the rotary part is

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arranged to rotate, and the shaft being configured to receive electrical connection means 56 configured to provide an electrical connection between the current generating means and generator electrical means, a second rotary part B having vanes 34, the second rotary part arranged to rotate in a second opposite direction around the axis when exposed to a flow of air perpendicular to the axis, the second rotary part operatively connected to a second generator means 22, rotary parts, binding means 42.

9. Claims 1-3, 8, and 10-14 are rejected under 35 U.S.C. 102(b) as being anticipated by Sheridan et al. (GB 2341646).

Sheridan et al. disclose invention as claimed: a generator generating an electric current and including current generating means having first generator means 19 and second generator means 10 arranged to generate electric current in response to relative rotation between the first and second generator means, a first rotary part 20 having vanes 21 rotating in a first direction around an axis when exposed to a flow of air perpendicular to the axis, the first rotary part operatively connected to the first generation means, the axis passing through an axial shaft 12 about which the rotary part is arranged to rotate, and the shaft being configured to receive electrical connection means configured to provide an electrical connection between the current generating means and generator electrical means (see page 3, lines 23-27), a second rotary part 10 having vanes 11, the second rotary part arranged to rotate in a second opposite direction around the axis when exposed to a flow of air perpendicular to the axis, the second rotary part operatively connected to a second generator means (see

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page 3, lines 19-24), a third rotary part 30 arranged to rotate in the same direction as, and operatively connected to the same generator means as, the first rotary part.

10. Claims 1, 2, 4 and 5 are rejected under 35 U.S.C. 102(b) as being anticipated by Rea (US 6,249,058).

Rea discloses invention as claimed: a generator generating an electric current and including current generating means having first generator means 26 and second generator means 14 arranged to generate electric current in response to relative rotation between the first and second generator means, a first rotary part having vanes 54 rotating in a first direction around an axis when exposed to a flow of air perpendicular to the axis, the first rotary part operatively connected to the first generation means, the axis passing through an axial shaft 16, 62 about which the rotary part is arranged to rotate, and the shaft being configured to receive electrical connection means 42 configured to provide an electrical connection between the current generating means and generator electrical means, a second rotary part having vanes 24, the second rotary part arranged to rotate in a second opposite direction around the axis when exposed to a flow of air perpendicular to the axis, the second rotary part operatively connected to a second generator means 14, and the axial shaft having sections 16, 62 releasably engageable with one other section.

***Claim Rejections - 35 USC § 103***

11. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the

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invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

12. Claim 6 is rejected under 35 U.S.C. 103(a) as being unpatentable over Peed (US 4,061,926), or Sheridan et al. (GB 2341646), or Rea (US 6,249,058) in view of Appa (US 20030006614).

Peed, Sheridan et al. and Rea (US 6,249,058), all disclose the generator essentially as claimed. However, neither Peed, or Sheridan et al. or Rea disclose the generator including a rotary part configured to allow air to flow through the rotary part in a direction along the axis during rotation.

Appa discloses a wind turbine generator furnished with a rotary part 89 configured to allow air to flow through the rotary part in a direction 38 along the axis during rotation for the purpose of cooling the generator 80.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to design the wind turbine generator as taught by Peed, or Sheridan et al. or Rea and to provide the rotary part configured to allow air to flow through the rotary part in a direction along the axis during rotation as taught by Appa for the purpose of cooling the electric windings of the generator.

***Allowable Subject Matter***

13. Claim 7 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

### ***Prior Art***

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

### ***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Joseph Waks whose telephone number is (571) 272-2037. The examiner can normally be reached on Monday through Thursday 8 am to 5 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Darren E. Schuberg can be reached on (571) 272-2044. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only.



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For more information about the PAIR system, see <http://pair-direct.uspto.gov>.

Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



Joseph Waks  
Primary Examiner  
Art Unit 2834

6/15/07